UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/501,577	08/23/2005	Allen K Murray	355870.900440	9310

7590 12/19/2008

Allen K. Murray, Ph.D.
Glycozyme, Inc.
Suite E
17935 Sky Park Circle
Irvine, CA 92614-6321

EXAMINER	
KHAN, AMINA S	

ART UNIT	PAPER NUMBER
1796	

MAIL DATE	DELIVERY MODE
12/19/2008	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/501,577	MURRAY, ALLEN K	
	Examiner	Art Unit	
	AMINA KHAN	1796	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *12 September 2008*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-13* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-10* is/are rejected.

7)☒ Claim(s) *11-13* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☒ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *12 July 2004* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

1. This office action is in response to applicant's arguments filed on September 12, 2008.

2. Claims 1-13 are pending.

3. Claims 11-13 stand objected to under 37 CFR 1.75(c) as being in improper form because a multiple dependent claim should refer to **other claims in the alternative only** and cannot depend from any other multiple dependent claim. **See MPEP § 608.01(n)**. Accordingly, the claims have not been further treated on the merits.

4. The rejection of claims 1-10 under 35 U.S.C. 112, second paragraph, are withdrawn in view of applicant's arguments.

5. Claims 1-5 and 7-10 stand rejected under 35 U.S.C. 102(b) as being anticipated by Murray (WO 99/35491) for the reasons set forth in the previous office action.

6. The rejection of claim 6 under 35 U.S.C. 102(b) as being anticipated by Murray (WO 99/35491) is withdrawn in view of applicant's arguments.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claim Rejections - 35 USC § 103

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

9. Claims 5-10 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Clarkson et al. (US 6,251,144).

Clarkson et al. teach treating denim with cellulase followed by treatments with protease and analysis of the degree of abrasion of the fabric afterword (column 8, lines 45-65). Clarkson et al. further teach using different cellulases and proteases (column 9, lines 5-15; column 3, line 60 to column 4, line 30) and adding pH agents to adjust pH from 4-6 (column 5, lines 45-46; column 7, lines 25-45). Clarkson et al. further teach measuring reflectance and visual observation of the fabrics after treatment (column 6, lines 1-15).

Accordingly, the teachings of Clarkson et al. are sufficient to anticipate the material limitations of the instant claims.

In the alternative if the teachings of Clarkson et al. are not sufficient to anticipate the material limitations of the instant claims, it would have been nonetheless obvious that the teachings of Clarkson et al. would incorporate the cell wall characterization since Clarkson et al. teach treating similar fabrics, cottons, with similar enzymes, cellulases, in similar sequences followed by analysis of the end product. The level of abrasion and reflectance would be a characterization of the fiber cell wall. Furthermore, since all the active method steps are met, the preamble of characterizing cotton fiber cell wall is given little patentable weight.

Response to Arguments

10. Applicant's arguments filed regarding Murray have been fully considered but they are not persuasive. The examiner asserts that Murray clearly teach that cottons are treated with carbodiimides to form covalent bonds specifically amide bonds and that essentially pure cellulose is produced (page 28, claims 4-7). Regarding the limitation of "characterizing cotton fiber cell walls" this limitation is simply recited in the preamble and was given little patentable weight. Since the only active method step of the claim is the step of treating sequentially with cellulases and proteases and this step is clearly taught by the prior art, the limitations of the claim are met. Furthermore, in the abstract, Murray clearly teach that multimers analyzed are indicative of textile wear which would clearly be an indication of the integrity of the cotton cell wall.

11. Regarding the rejection of the claims as not being in proper multiple dependent form, this rejection is due to the claims **not being in the alternative form**. The language "claim 5-10" is improper. In MPEP section 608.01(n) acceptable alternative wording examples are highlighted. The examiner suggests the applicant reword claim 11 in one of the acceptable exemplified form discussed below.

I. MULTIPLE DEPENDENT CLAIMS

37 CFR 1.75. Claim(s).

(c) One or more claims may be presented in dependent form, referring back to and further limiting another claim or claims in the same application. Any dependent claim which refers to more than one other claim ("multiple dependent claim ") shall refer to such **other claims in the alternative only.** A multiple dependent claim shall not serve as a basis for any other multiple dependent claim.

A. Acceptable Multiple Dependent Claim Wording

Claim 5. A gadget according to claims 3 or 4, further comprising ---

Claim 5. A gadget as in any one of the preceding claims, in which ---

Claim **5. A gadget as in any one of claims 1, 2, and 3, in which ---**

Claim 3. A gadget as in either claim 1 or claim 2, further comprising ---

Claim 4. A gadget as in claim 2 or 3, further compri-sing ---

Claim 16. A gadget as in claims 1, 7, 12, or 15, further comprising ---

Claim 5. A gadget as in any of the preceding claims, in which ---

Claim 8. A gadget as in one of claims 4-7, in which ---

Claim 5. A gadget as in any preceding claim, in which ---

Claim 10. A gadget as in any of claims 1-3 or 7-9, in which ---

Claim 11. A gadget as in any one of claims 1, 2, or 7-10 inclusive, in which ---

B. Unacceptable Multiple Dependent Claim Wording

1. Claim Does Not Refer Back in the Alternative Only

Claim 5. A gadget according to claim 3 and 4, further comprising ---

Claim 9. A gadget according to claims 1-3, in which ---

Claim 9. A gadget as in claims 1 or 2 and 7 or 8, which ---

Claim 6. A gadget as in the preceding claims in which ---

Claim 6. A gadget as in claims 1, 2, 3, 4 and/or 5, in which ---

Claim 10. A gadget as in claims 1-3 or 7-9, in which ---

2. Claim Does Not Refer to a Preceding Claim

Claim 3. A gadget as in any of the following claims, in which ---

Claim 5. A gadget as in either claim 6 or claim 8, in which ---

Conclusion

12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to AMINA KHAN whose telephone number is (571)272-5573. The examiner can normally be reached on Monday through Friday, 8:30-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vasu Jagannathan can be reached on (571) 272-1119. The fax phone

number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Amina Khan/
Examiner, Art Unit 1796
December 17, 2008

/DOUGLAS MC GINTY/
Primary Examiner, Art Unit 1796